ATTACHMENT 1

TECHNICAL FEASIBILITY STATEMENT REGARDING THE 8-DIGIT OVERLAY PROPOSAL

The following page makes up ATTACHMENT 1

Re: Technical feasibility of the 8-Digit Dialing Plan proposed by Gilbert J. Yablon

To Whom It May Concern:

In July of 1997 I retired as the Executive Director - Operations and Engineering for the United States Telephone Association (USTA) after 36 plus years of experience encompassing diverse disciplines in the telecommunications industry.

As the Executive Director of the Technical Disciplines Department, I managed a large portion of the technical committee activities at USTA associated with numbering issues. As part of my responsibilities, I was required to regularly attend and participate in most of the industry meetings concerning numbering matters. I served as Chair or Co-Chair on a number of these various committees and working groups including the Industry Numbering Committee (INC).

I have thoroughly reviewed Gilbert J. Yablon's 8-Digit Dialing Plan and have found it to be a technically feasible plan that should be considered when addressing area code relief. The plan does conform to the NANP in that each customer retains a seven digit address (ten digit including area code) and the eighth digit is used for dialing purposes only to identify the specific NPA.

As with any plan to provide relief, there will be costs associated with the plan. The cost and the extent of equipment modifications that will incurred by the industry for each of the alternatives considered can only be addressed by the industry. The same is true for the cost to be incurred by the consumer. A cross-section of consumer groups needs to compile this data. And no matter what plan is implemented there will be customer confusion and education.

Providing area code relief is expensive and disruptive to both the industry and the consumer, therefore, all methods available that would ease this burden should be considered in enough detail to minimize the impacts.

Sincerely,

Dennis J. Byrne
1925 Rollingwood Drive
Fairfield, CA 94533

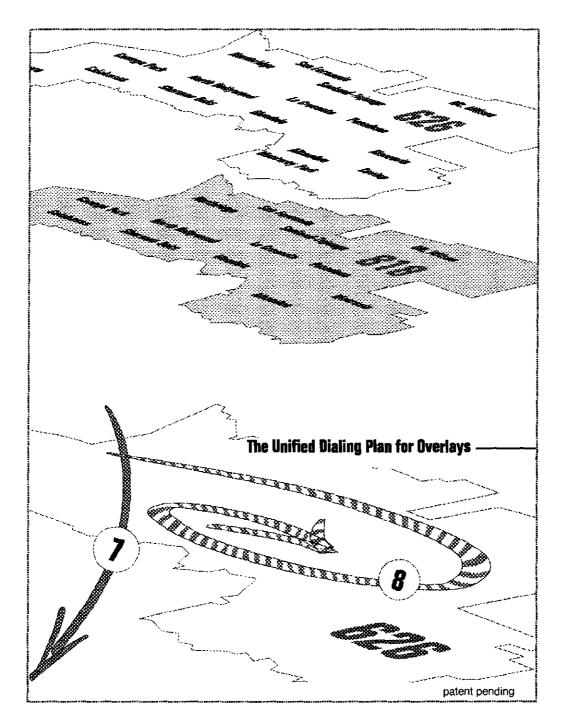
707-435-8285

ATTACHMENT 2A

UNIFIED DIALING PLAN FOR OVERLAYS DESCRIPTION

The following pages makes up ATTACHMENT 2A

Note: This document was originally created in 1997, and therefore some of its reference may be some what dated. In particular, it describes 818 and 626 as area codes that might be used to implement this 8-digit overlay system. These references are only to be used as hypothetical examples, and no argument is being made to implement the overlay with those two area codes.



Revised 11/15/98

Proposal

Contact:

Gilbert Yablon The Unified Dialing Plan for Overlays 21914 Dumetz Rd. Woodland Hills, CA 91364 818-999-1070-0 - (voice) 818-956-2200-0 - (alt. voice) 818-956-3298-0 - (fax) UNIFIEDdpo@aol.com - email

"The Unified Dialing Plan for Overlays"

A Simplified 8 Digit Dialing System For Use With Overlaid Area Codes proposed by Gilbert Yablon revised 11/15/98

Introduction:

The Unified Dialing Plan for Overlays (UDPFO) offers a set of enhancements for standard overlay implementations. These enhancements simplify the public's transition to overlays by preserving the look and feel of non-overlay dialing within the affected area.

The main features of the UDPFO are:

- 1) An 8 digit dialing method can be used for all phone calls within the overlay region, allowing customers to dial just 7 digits + "1 additional digit" for indicating the intended area code.
- 2) A "safety net" is provided to catch any calls that might continue to be dialed with the old 7 digit method. This backward compatible feature facilitates transition to the new 8 digit plan. In emergencies this feature may also help avoid disasters since it could continue to allow unattended auto dialing systems including fire and burglar alarms to complete calls even if they have not been reprogrammed.
- 3) 10 digit and 1+10 digit dialing is available for all calls, but with the UDPFO it is not mandatory to dial this way.
- 4) The special 8 digit dialing method and the 7 digit safety net are optional features. They are available for those customers who wish to take advantage of these consumer friendly dialing alternatives. If customers prefer to dial 10 digits or 1+10 digits for every call (as is required in standard overlays), they can easily bypass the enhanced features of the UDPFO.

How it works:

The UDPFO can be thought of as an intelligent system that sits on top of (or is part of) a standard telephone company switch. It does not in any manner alter the way in which phone numbers are handled by the telephone network. It merely provides an alternate method of accessing the industry standard 3 digit area code + 7 digit phone number system. Within traditional Numbering Plan Areas (NPAs), the area code is implied, and calls can be completed by dialing just 7 digits. In overlay regions, where multiple area codes exist within a single geographic area, the UDPFO allows the intended area code to be indicated with a single digit - instead of 3 digits. By dialing 7 digits in the traditional manner and then dialing only one additional digit (the new "8th" digit), the user can indicate which of the area codes in the region that the call is intended for. The 8 digit number is then translated into an industry standard 10 digit number before any switching occurs. The network and all switches will process this number as if it had been originally dialed as 10 digits or 1+10 digits.

UDPFO.doc ©1996 Gilbert Yablon PAGE 1 of 6 PAGES

This simple plan for overlays could also be called the "SMART" Dialing System.

"Smart" is an acronym for:

S implified

M ulti

A rea Code

R egion

T elephone Dialing System

The "SMART" system offers the following advantages over standard overlays:

- It greatly reduces the confusion and inconvenience that is associated with having multiple area codes within individual neighborhoods and households.
- It provides a simplified dialing system which allows customers throughout the overlay region to dial just 8 digits instead of 10 digits or 1+10 digits for all calls within the region.
- It minimizes the hardship normally associated with an area code change, especially for children, handicapped persons and the elderly.
- It ensures that unattended auto dialers (like fire alarms and burglar alarms) will be able to complete calls even without reprogramming.
- It reduces the likelihood that the new overlay area code will be a stigma for new businesses.
- It reduces the public's resistance to accepting overlays for area code relief.

Defining these terms will b	e helpful for the discussions that follow:
original area code	The area code that existed in the region before any other area codes were overlaid on top of it. In these examples the 818 area code is the <i>original area code</i> or <i>level</i> of the overlay.
<u>new</u> area code	A new overlaid area code. In these examples the 626 area code is the first new area code or level of the overlay.
home overlay region	A single geographic region which contains the original area code and all of the new overlaid area codes.
home overlay region calls	Refers to calls where the originating and the destination area codes both reside within the same geographic region.
abbreviated dialing	Dialing which requires fewer than 10 digits to complete.
	Today, abbreviated dialing within a single area code typically requires dialing just 7 digits.
	In a Unified Dialing Plan for Overlays scenario, where multiple area codes occupy the same geographic region, abbreviated dialing is accomplished by dialing just 7 digits + "1 additional digit" for indicating the area code.

UDPFO.doc ©1996 Gilbert Yablon PAGE 2 of 6 PAGES

In Brief:

This plan proposes a system in which dialing within a "home overlay region" is facilitated by:

- An <u>"8 digit"</u> dialing method which can be used for all "home overlay region calls." Customers will dial 7 digits + "1 additional digit." The "1 additional digit" indicates the intended area code.
- A permissive "7 digit + timing" default mechanism which facilitates the changeover from 7 digit dialing to the new 8 digit dialing system. After the transition period is complete, this feature can continue to provide an emergency "safety net" which will ensure that unattended auto dialers (like fire alarms and burglar alarms) will be able to complete calls without reprogramming. And...
- "10 digit" (or "1+10 digit") dialing which is always available for all calls. Industry standard 10 digit phone numbers are the backbone of this dialing plan, and 10 digit dialing should be made available for customers who prefer to dial this way. The "8 digit" dialing option is merely an alternative (or short cut) method for accessing these same industry standard 10 digit numbers.

Refer to Fig. 4A at the end of this report for an illustration of how these three dialing methods are integrated in the Unified Dialing Plan for Overlays.

This plan is applicable to any area where an overlay might need to be implemented. The following hypothetical illustrations describe 818 as the original area code, and 626 as the first new "overlaid" level.

How the plan would be implemented:

Each area code within a "home overlay region" will be assigned a one digit identifier which can then be used as the 8th digit (or suffix) when dialing.

In our hypothetical 818/626 home overlay region, the suffixes would be assigned as follows:

- All 818 numbers would receive a suffix of "0" (representing the original level).
- All 626 numbers would receive a suffix of "1" (representing the first new level).
- Any future overlay levels would receive a suffix of "2" "9" in that order. This framework will allow for easy future expansion when more numbers are needed.

For example:

123-4567-0 = **1-818-123-4567** Within the 818/626 overlay region, either style is valid.

123-4567-1 = 1-626-123-4567 Within the 818/626 overlay region, either style is valid.

123-4567-2 = 1-???-123-4567 Within the 818/626/??? overlay region, either style will be valid (for a third overlaid area code).

Further:

• A "safety net" is provided which facilitates transition to this new 8 digit plan. After 7 digits are dialed a timing interval begins. If an 8th digit is not entered before the interval elapses the call will default to the "original" area code of the overlay grouping. This feature provides backward compatibility with existing dialing patterns during transition, and ensures that old style 7 digit calls will complete in emergency situations.

For example:

123-4567+timing delay = 1-818-123-4567

Defaults to 818 + 7 digit number to accommodate existing dialing patterns. The industry would determine the appropriate length for this timing delay.

UDPFO.doc ©1996 Gilbert Yablon PAGE 3 of 6 PAGES

From anywhere within the overlay area, the dialing plan would operate as follows:

- Once 7 digits are received, the phone system will wait an additional timing period (to be determined by the industry) for a possible 8th digit which technically is the "overlay area code selector."
- If 8 digits are received, phone system equipment will run an analysis on the number, examining the 8th digit to determine the intended area code.
- If the 8th digit is a "0", the call will be directed to the 818 level of the overlay.
- If the 8th digit is a "1", the call will be directed to the 626 level of the overlay.
- If the industry determined "timing delay" elapses before the 8th digit is received, a suffix of "0" is assumed, and the 7 digit call will automatically be directed to the 818 level of the overlay. This "default" mechanism will facilitate a smooth transition from 7 digit dialing to the new 8 digit plan.
- If an industry determined "timing delay" elapses and less than 7 digits have been received, the call is considered abandoned, and the standard "try again" message is given.
- Once the proper overlay level is determined and the call is routed to the proper area code within the overlay region, the suffix is discarded, leaving a standard 7 digit number to be routed by traditional 7 digit switching systems.
- To summarize, all "7 digit + suffix" or "7 digit + timing" calls are converted to 10 digit or 1+10 digit numbers by the phone system, and are then transparently routed to the proper overlay level.

Note: 10 digit or 1 + 10 digit dialing for home overlay region calls would also be supported, if that were how people preferred to dial, but it would not be mandatory.

Handling local or toll calls going outside the 818/626 overlay region:

Mandatory 10 digit dialing or 1 + 10 digit dialing would be used for dialing to any number outside of the 818/626 overlay region. If someone in the overlay region were to accidentally use the "10 + x" or "1 + 10 + x" format (because they had become accustomed to dialing 8 digit phone numbers) it wouldn't matter because in 10 digit and 1 + 10 digit dialing the network ignores all extra digits beyond 10 or 1+10.

Handling local or toll calls coming into the 818/626 overlay region:

When calling from outside of the 818/626 region, standard 10 digit or 1 + 10 digit dialing would be used to dial to any number inside of the 818/626 region. If someone from outside the 818/626 region were to accidentally use the "10 + x" or "1 + 10 + x" format (because they were unclear as to the correct dialing rules) it wouldn't matter because the network will ignore any extra digits beyond 10 or 1+10.

Directory listings:

In the 818/626 telephone directories the numbers will be listed as follows:

legend:	7 digits + "0"	= 818 area code	7 digits + "1" = 626 area code
818 number	999-3360-0		
626 number	956-2200-1		
213 number	213-462-2110	out of	"overlay area" number
626 number	347-9426-1		v
818 number	883-6234-0		
818 number	830-9339-0		
818 number	982-7417-0		
626 number	889-4509-1		
310 number	310-244-0177	out of	"overlay area" number
UDPFO.doc		©1996 Gilbert Yabl	on PAGE 4 of 6 PAGES

(Directory listings continued)

Because no area codes would need to be listed for "home overlay region" phone numbers, the "new" 626 numbers (which a new business might have) will not stand out as red flags to customers looking for experienced services. Naturally, phone numbers with area codes outside of the "home overlay region" would stand out, as is already the case in current directories.

To further remind people how the system works, a sticker could be supplied to customers in the 818/626 region. For example:

8 digit dialing supported:

7 digit phone number + 0 = 818 area code 7 digit phone number + 1 = 626 area code

How to inform the public on how to use the new plan:

On and after the date that this plan is to take effect:

Calls made from any telephone within the 818/626 overlay region can be dialed as follows:

- For calls to <u>818</u> numbers:
 - Dial the 7 digit number like you always have, and then enter a "0."
- For calls to <u>626</u> numbers:

Dial 7 digits, and then enter a "1."

- For calls to phone numbers in area codes <u>outside</u> of the 818/626 overlay region: Dial 1 + area code + 7 digits -- the same as you would before the overlay went into effect.
- Note, if only 7 digits are dialed:

If you do not enter an 8th digit, after a <u>significant</u> delay your call will default to the dialed 7 digit number in the <u>818</u> area code. You should always dial the appropriate 8th digit in order to avoid this delay.

For calls made from area codes outside of the 818/626 overlay region:

• <u>to</u> any area code within the 818/626 overlay region:
Dial 1 + area code + 7 digits -- the same as you would before the overlay went into effect.

Conclusion

This plan addresses customers' objections to using overlays which they fear would result in confusion and/or the inconvenience of having to dial 10 digits or 1+11 digits just to call across the street.

The plan allows for abbreviated "7 digit + suffix" dialing from and to any phone within the entire overlay region, without affecting how 10 digit or 1 + 10 digit calls "out-of", "into", or within the overlay region are handled. It is expandable to 10 levels (0-9) of overlay within a single geographic dialing region, allowing for painless addition of many new numbers in the future.

A "safety net" is provided to facilitate transition from 7 digit dialing to the new 8 digit dialing method, which will also minimize the need to reprogram unattended automatic dialing devices (like burglar alarms and fire alarms), and will minimize lost calls in emergency situations.

Additionally, the new style of directory listings won't be a disadvantage for new businesses.

UDPFO.doc ©1996 Gilbert Yablon PAGE 5 of 6 PAGES

For the public, this plan will have the psychological appeal of being a new "high tech" solution to the challenges presented by splits and standard overlays. It addresses all of the public's concerns about overlays, and will leave citizens and businesses with a feeling that something is finally being done to protect them from the hardship and inconvenience that traditionally comes with area code exhaust and relief.

When the advantages of this plan are weighed against the disadvantages of area code splits and standard implementations of overlays (expense, disruption, confusion, inconvenience, permanent impact on the size of geographic dialing areas, etc.), this unified dialing plan for overlays clearly makes sense as a solution for both the short and the long term.

This system can be applied to any area that is faced with the need to introduce an overlay. If this system becomes a standard, over time large areas of North America would be able to locally take advantage of this plan without affecting how any "out of region" or "into region" dialing and switching is handled.

Illustrations:

Using the 818/626 area codes as an example, the attached diagrams illustrate how dialing patterns are impacted by various forms of area code relief.

- Figure 1A shows the established dialing patterns in an area code prior to implementing relief.
- Figure 2A shows how an area code split disrupts established dialing patterns.
- Figure 3A shows how a <u>standard overlay</u> impacts established dialing patterns and how its overlay levels are not united by a distinctive dialing plan.
- Figure 4A shows how <u>The Unified Dialing Plan for Overlays</u> unifies all levels of the
 overlay region with a simple 8 digit dialing system, and how it provides a "safety net"
 which facilitates transition from 7 digit dialing to the new 8 digit dialing method and
 minimizes lost calls in emergency situations.

Submitted by:

Gilbert Yablon The Unified Dialing Plan for Overlays 21914 Dumetz Rd. Woodland Hills, CA 91364

818-999-1070-0 - (voice) 818-956-2200-0 - (alt. voice) 818-956-3298-0 - (fax)

UNIFIEDdpo@aol.com - email

UDPFO.doc

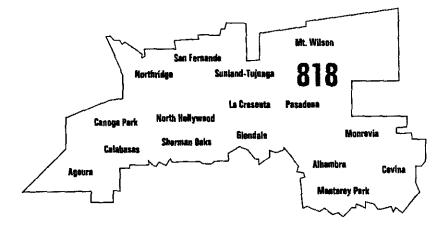


Fig.1: Communities Involved

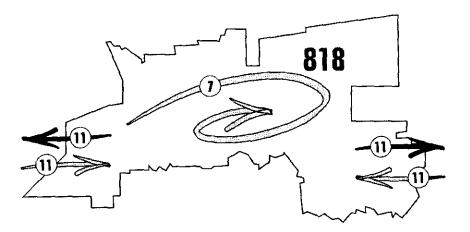


Fig.1A: Dialing Patterns

Dialing Options

7 Digit Dialing Within 818

1

Within 818 123-4567

11 Digit Dialing Into Area

1+818+123-4567

Out of Area 1+NXX+123-4567

© 1997 Gilbert Yabion

This map shows the established dialing patterns of an area code before being impacted by area code relief. These dialing patterns will be disrupted by either a split or a standard overlay.

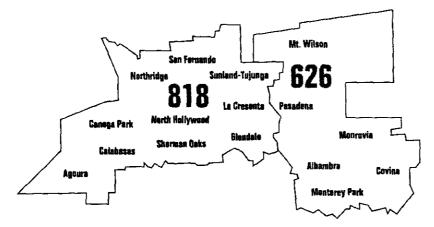


Fig.2: Communities Involved

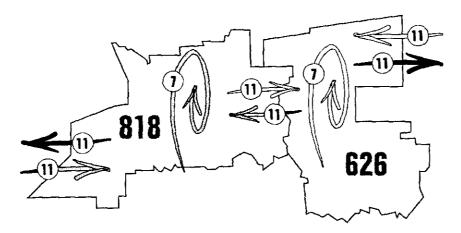


Fig.2A: Dialing Patterns

	7 Digit Dialing
\wedge	Within 818
((A)	123-4567
-	or
(a)	Within 626
(10)	123-4567
	120-7001
	11 Digit Dialing
	Into Area
_>	1+818+123-4567
	1+626+123-4567
	Out of Area
>	1+NXX+123-4567
	Between 818/626
~ ~ >	1+818+123-4567
	1+626+123-4567
	: I UEU I IEU TUU!

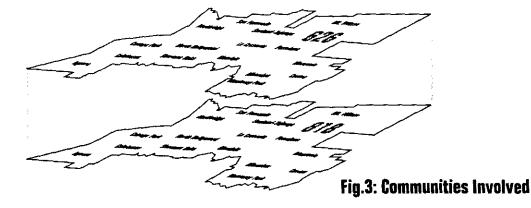
© 1997 Gilbert Yablon

Dialing Options

fig.2

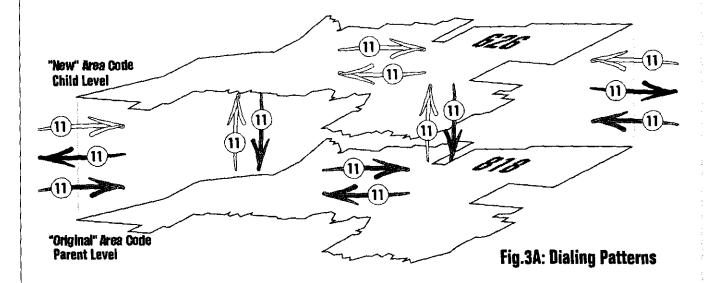
Implementing a split greatly impacts dialing for calls both within and into the original NPA. This method of relief is expensive for business and disruptive to all customers, both within and outside of the affected area.

The Standard Overlay Method



Dialing Options

7 Digit Dialing
Thought to be impractical for
this Overlay Method



Mandatory 11 Digit Dialing Into Area

1+818+123-4567

or 1+626+123-4567

Out of Area

--> 1+NXX+123-4567

Within 818/626 Area

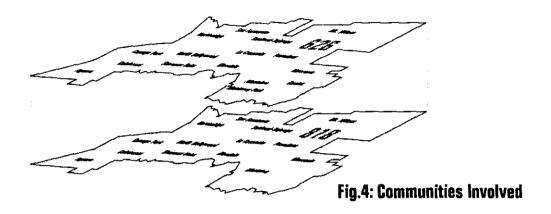
1+818+123-4567

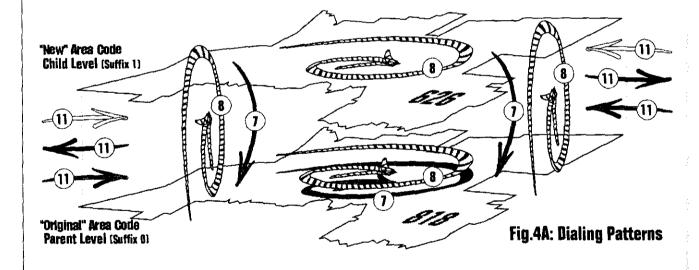
or 1+626+123-4567

With abbreviated dialing abandoned, the overlay levels are not unified by a distinctive dialing plan. The concern that this mix of area codes will cause hardship and confusion for citizens has prevented overlays from becoming widely accepted.

fig

The Unified Dialing Plan for Overlays -





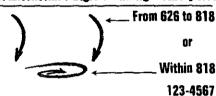
Dialing Options

Unified - 8 Digit Dialing (7+X)



Within 818/626 Area 123-4567+0 (for 818) 123-4567+1 (for 626)

Transitional 7 Digit + Timing - Safety Net From 626 to 818



1+10 = 11 Digit Dialing

Into Area 1+818+123-4567 or 1+626+123-4567

Out of Area 1+NXX+123-4567

Note: For Optional 11 Bigit Dialing

Within 818/626 Area Refer to Fig. 3A

This overlay method provides for long term relief AND maintains the intregity of the original dialing area by:

1) Unifying all levels of the overlay with a simple 8 digit (7+suffix) dialing system.

2) Creating a backwkard compatible 'Safety Net' which facilitates transition and prevents old style 7 digit calls from being lost.

3) Allowing for optional (not mandatory) 1+10 digit dialing between levels of the overlay.

ATTACHMENT 2B

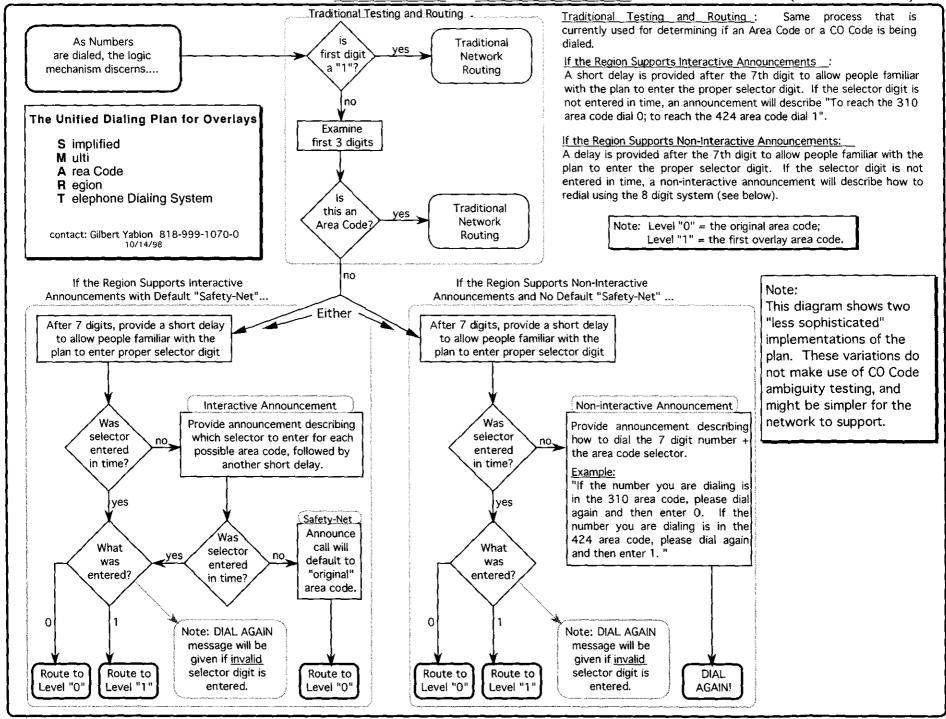
LOGIC FLOW DIAGRAM FOR TWO VARIATIONS OF THE PROPOSAL

The following page makes up ATTACHMENT 2B

Note: This diagram is only provided as a general guide to visually demonstrate how the system determines what is being dialed and how the dialed numbers are translated and routed. It is not a definitive description of the plan.

Two possible variations are shown as examples only.

UDPFO LOGIC FLOW DIAGRAM with INTERACTIVE or NON-INTERACTIVE ANNOUNCEMENT (versions C&D)



ATTACHMENT 3

THE TELECOMMUNICATIONS ACT OF 1996 SECTION 251

The following $\,$ pages make up ATTACHMENT 3 $\,$

paragraph defines more than one term; and

- (B) the words 'The term';
- (7) by changing the first letter of each defined term in such paragraphs from a capital to a lower case letter (except for `United States', `State', `State commission', and `Great Lakes Agreement'); and
- (8) by reordering such paragraphs and the additional paragraphs added by subsection (a) in alphabetical order based on the headings of such paragraphs and renumbering such paragraphs as so reordered.
- (d) CONFORMING AMENDMENTS- The Act is amended--
 - (1) in section 225(a)(1), by striking `section 3(h)' and inserting `section 3';
 - (2) in section 332(d), by striking `section 3(n)' each place it appears and inserting `section 3'; and
 - (3) in sections 621(d)(3), 636(d), and 637(a)(2), by striking `section 3(v)' and inserting `section 3'.

TITLE 1--TELECOMMUNICATION SERVICES SUBTITLE A--TELECOMMUNICATIONS SERVICES

SEC. 101. ESTABLISHMENT OF PART II OF TITLE II.

(a) AMENDMENT- Title II is amended by inserting after section 229 (47 U.S.C. 229) the following new part:

`PART II--DEVELOPMENT OF COMPETITIVE MARKETS `SEC. 251. INTERCONNECTION.

- `(a) GENERAL DUTY OF TELECOMMUNICATIONS CARRIERS- Each telecommunications carrier has the duty--
 - `(1) to interconnect directly or indirectly with the facilities and equipment of other telecommunications carriers; and
 - `(2) not to install network features, functions, or capabilities that do not comply with the guidelines and standards established pursuant to section 255 or 256.
- `(b) OBLIGATIONS OF ALL LOCAL EXCHANGE CARRIERS- Each local exchange carrier has the following duties:
 - `(1) RESALE- The duty not to prohibit, and not to impose unreasonable or discriminatory conditions or limitations on, the resale of its telecommunications services.
 - `(2) NUMBER PORTABILITY- The duty to provide, to the extent technically feasible, number portability in accordance with requirements prescribed by the Commission.
 - `(3) DIALING PARITY- The duty to provide dialing parity to competing providers of telephone exchange service and telephone toll service, and the duty to permit all such providers to have nondiscriminatory access to telephone numbers, operator services, directory assistance, and directory listing, with no

unreasonable dialing delays.

- `(4) ACCESS TO RIGHTS-OF-WAY- The duty to afford access to the poles, ducts, conduits, and rights-of-way of such carrier to competing providers of telecommunications services on rates, terms, and conditions that are consistent with section 224.
- `(5) RECIPROCAL COMPENSATION- The duty to establish reciprocal compensation arrangements for the transport and termination of telecommunications.
- `(c) ADDITIONAL OBLIGATIONS OF INCUMBENT LOCAL EXCHANGE CARRIERS-

In addition to the duties contained in subsection (b), each incumbent local exchange carrier has the following duties:

- `(1) DUTY TO NEGOTIATE- The duty to negotiate in good faith in accordance with section 252 the particular terms and conditions of agreements to fulfill the duties described in paragraphs (1) through (5) of subsection (b) and this subsection. The requesting telecommunications carrier also has the duty to negotiate in good faith the terms and conditions of such agreements.
- `(2) INTERCONNECTION- The duty to provide, for the facilities and equipment of any requesting telecommunications carrier, interconnection with the local exchange carrier's network--
 - `(A) for the transmission and routing of telephone exchange service and exchange access;
 - `(B) at any technically feasible point within the carrier's network;
 - `(C) that is at least equal in quality to that provided by the local exchange carrier to itself or to any subsidiary, affiliate, or any other party to which the carrier provides interconnection; and
 - `(D) on rates, terms, and conditions that are just, reasonable, and nondiscriminatory, in accordance with the terms and conditions of the agreement and the requirements of this section and section 252.
- `(3) UNBUNDLED ACCESS- The duty to provide, to any requesting telecommunications carrier for the provision of a telecommunications service, nondiscriminatory access to network elements on an unbundled basis at any technically feasible point on rates, terms, and conditions that are just, reasonable, and nondiscriminatory in accordance with the terms and conditions of the agreement and the requirements of this section and section 252. An incumbent local exchange carrier shall provide such unbundled network elements in a manner that allows requesting carriers to combine such elements in order to provide such telecommunications service.

`(4) RESALE- The duty--

- `(A) to offer for resale at wholesale rates any telecommunications service that the carrier provides at retail to subscribers who are not telecommunications carriers; and
- `(B) not to prohibit, and not to impose unreasonable or discriminatory conditions or limitations on, the resale of such telecommunications service, except that a State commission may, consistent with regulations prescribed by the Commission under this section, prohibit a reseller that obtains at wholesale rates a telecommunications service that is available at retail only to a category of subscribers from offering such service to a different category of subscribers.
- `(5) NOTICE OF CHANGES- The duty to provide reasonable public notice of changes in the information necessary for the transmission and routing of services using that local exchange carrier's facilities or networks, as well as of any other changes that would affect the interoperability of those facilities and networks.
- `(6) COLLOCATION- The duty to provide, on rates, terms, and conditions that are just, reasonable, and nondiscriminatory, for physical collocation of equipment necessary for interconnection or access to unbundled network elements at the premises of the local exchange carrier, except that the carrier may provide for virtual collocation if the local exchange carrier demonstrates to the State commission that physical collocation is not practical for technical reasons or because of space limitations.

`(d) IMPLEMENTATION-

- `(1) IN GENERAL- Within 6 months after the date of enactment of the Telecommunications Act of 1996, the Commission shall complete all actions necessary to establish regulations to implement the requirements of this section.
- `(2) ACCESS STANDARDS- In determining what network elements should be made available for purposes of subsection (c)(3), the Commission shall consider, at a minimum, whether--
 - `(A) access to such network elements as are proprietary in nature is necessary; and
 - `(B) the failure to provide access to such network elements would impair the ability of the telecommunications carrier seeking access to provide the services that it seeks to offer.
- `(3) PRESERVATION OF STATE ACCESS REGULATIONS- In prescribing and enforcing regulations to implement the requirements of this

section, the Commission shall not preclude the enforcement of any regulation, order, or policy of a State commission that-

- `(A) establishes access and interconnection obligations of local exchange carriers;
- `(B) is consistent with the requirements of this section; and
- `(C) does not substantially prevent implementation of the requirements of this section and the purposes of this part.
 `(e) NUMBERING ADMINISTRATION-
- `(1) COMMISSION AUTHORITY AND JURISDICTION- The Commission shall create or designate one or more impartial entities to administer telecommunications numbering and to make such numbers available on an equitable basis. The Commission shall have exclusive jurisdiction over those portions of the North American Numbering Plan that pertain to the United States. Nothing in this paragraph shall preclude the Commission from delegating to State commissions or other entities all or any portion of such jurisdiction.
- `(2) COSTS- The cost of establishing telecommunications numbering administration arrangements and number portability shall be borne by all telecommunications carriers on a competitively neutral basis as determined by the Commission.
- (f) EXEMPTIONS, SUSPENSIONS, AND MODIFICATIONS-
 - `(1) EXEMPTION FOR CERTAIN RURAL TELEPHONE COMPANIES-
 - `(A) EXEMPTION- Subsection (c) of this section shall not apply to a rural telephone company until (i) such company has received a bona fide request for interconnection, services, or network elements, and (ii) the State commission determines (under subparagraph (B)) that such request is not unduly economically burdensome, is technically feasible, and is consistent with section 254 (other than subsections (b)(7) and (c)(1)(D) thereof).
 - `(B) STATE TERMINATION OF EXEMPTION AND IMPLEMENTATION SCHEDULE- The party making a bona fide request of a rural telephone company for interconnection, services, or network elements shall submit a notice of its request to the State commission. The State commission shall conduct an inquiry for the purpose of determining whether to terminate the exemption under subparagraph (A). Within 120 days after the State commission receives notice of the request, the State commission shall terminate the exemption if the request is not unduly economically burdensome, is technically feasible, and is consistent with section 254 (other than subsections (b)(7) and (c)(1)(D) thereof). Upon termination of the exemption, a State commission shall establish an

implementation schedule for compliance with the request that is consistent in time and manner with Commission regulations.

- '(C) LIMITATION ON EXEMPTION- The exemption provided by this paragraph shall not apply with respect to a request under subsection (c) from a cable operator providing video programming, and seeking to provide any telecommunications service, in the area in which the rural telephone company provides video programming. The limitation contained in this subparagraph shall not apply to a rural telephone company that is providing video programming on the date of enactment of the Telecommunications Act of 1996.
- `(2) SUSPENSIONS AND MODIFICATIONS FOR RURAL CARRIERS- A local exchange carrier with fewer than 2 percent of the Nation's subscriber lines installed in the aggregate nationwide may petition a State commission for a suspension or modification of the application of a requirement or requirements of subsection (b) or (c) to telephone exchange service facilities specified in such petition. The State commission shall grant such petition to the extent that, and for such duration as, the State commission determines that such suspension or modification--
 - `(A) is necessary--
 - `(i) to avoid a significant adverse economic impact on users of telecommunications services generally;
 - `(ii) to avoid imposing a requirement that is unduly economically burdensome; or
 - `(iii) to avoid imposing a requirement that is technically infeasible; and
 - `(B) is consistent with the public interest, convenience, and necessity.

The State commission shall act upon any petition filed under this paragraph within 180 days after receiving such petition. Pending such action, the State commission may suspend enforcement of the requirement or requirements to which the petition applies with respect to the petitioning carrier or carriers.

`(g) CONTINUED ENFORCEMENT OF EXCHANGE ACCESS AND INTERCONNECTION

REQUIREMENTS- On and after the date of enactment of the Telecommunications Act of 1996, each local exchange carrier, to the extent that it provides wireline services, shall provide exchange access, information access, and exchange services for such access to interexchange carriers and information service providers in accordance with the same equal access and nondiscriminatory

interconnection restrictions and obligations (including receipt of compensation) that apply to such carrier on the date immediately preceding the date of enactment of the Telecommunications Act of 1996 under any court order, consent decree, or regulation, order, or policy of the Commission, until such restrictions and obligations are explicitly superseded by regulations prescribed by the Commission after such date of enactment. During the period beginning on such date of enactment and until such restrictions and obligations are so superseded, such restrictions and obligations shall be enforceable in the same manner as regulations of the Commission.

`(h) DEFINITION OF INCUMBENT LOCAL EXCHANGE CARRIER-

- `(1) DEFINITION- For purposes of this section, the term `incumbent local exchange carrier' means, with respect to an area, the local exchange carrier that--
 - `(A) on the date of enactment of the Telecommunications Act of 1996, provided telephone exchange service in such area; and
 - `(B)(i) on such date of enactment, was deemed to be a member of the exchange carrier association pursuant to section 69.601(b) of the Commission's regulations (47 C.F.R. 69.601(b)); or
 - `(ii) is a person or entity that, on or after such date of enactment, became a successor or assign of a member described in clause (i).
- `(2) TREATMENT OF COMPARABLE CARRIERS AS INCUMBENTS- The Commission may, by rule, provide for the treatment of a local exchange carrier (or class or category thereof) as an incumbent local exchange carrier for purposes of this section if--
 - `(A) such carrier occupies a position in the market for telephone exchange service within an area that is comparable to the position occupied by a carrier described in paragraph (1);
 - (B) such carrier has substantially replaced an incumbent local exchange carrier described in paragraph (1); and
 - `(C) such treatment is consistent with the public interest, convenience, and necessity and the purposes of this section.
- `(i) SAVINGS PROVISION- Nothing in this section shall be construed to limit or otherwise affect the Commission's authority under section 201.

`SEC. 252. PROCEDURES FOR NEGOTIATION, ARBITRATION, AND APPROVAL

OF

AGREEMENTS.

`(a) AGREEMENTS ARRIVED AT THROUGH NEGOTIATION-

ATTACHMENT 4

CALIFORNIA TELECOMMUNICATIONS INDUSTRY REVIEW AND GILBERT YABLON'S RESPONSE

The following $\,$ pages makes up ATTACHMENT 4 $\,$

This attachment includes the Review / Response, and cover letters that were sent to Eleanor Szeto of the CPUC and Doug Hescox (formerly of the California / Nevada Code Administration).

Ms. Eleanor Yung Szeto California Public Utilities Commission Telecommunications Division 505 Van Ness Avenue San Francisco, CA 94102

Dear Ms. Szeto,

Thank you for taking the time to speak with me at the Culver City (310) area code relief hearing. As you suggested, I am submitting the attached document in response to the Telecommunications Industry's review of the <u>Unified Dialing Plan for Overlays</u>, so that the Commission can reconsider the merits of this plan in light of my response.

The industry's review offers me a great opportunity to clarify some misunderstandings, and to answer many questions about how the <u>Unified Dialing Plan for Overlays</u> (UDPFO) actually works, and the benefits it offers.

The attached document contains both the industry's comments about the UDPFO and my responses to those comments. I have included extra copies of this document so that you can easily distribute it to: Commissioners Conlon, Duque, Knight, Neeper and Bilas; and to other appropriate CPUC staff -- notably: yourself, Lorann King, Risa Hernandez and Karen Jones -- for evaluation.

The UDPFO offers an elegant, technically workable solution to a difficult, persistent problem. It presents a way to add new numbers to an exhausted area without disrupting any established dialing patterns to pre-relief phone numbers. Because it is "backwardly compatible" with established dialing patterns, implementing this plan will minimize the expense and hardship that local business and the public have traditionally endured every time relief has been necessary. Examination of the attached review/response will clarify why the UDPFO should be seriously considered by the Commission as an option for area code relief.

Thank you for taking this second look.

I will be happy to supply additional copies of this document as well as copies of the original <u>Unified Dialing Plan for Overlays</u> proposal, and any other materials or information you may require to assist in your evaluation.

Sincerely,

Gilbert Yablon ATTACHMENTS Mr. Doug Hescox Area Code Administrator California - Nevada Code Administration 2600 Camino Ramon, Rm. 1S900 San Ramon, CA 94583

Dear Mr. Hescox,

Thank you for taking the time to speak with me at the Culver City (310) area code relief hearing. As was suggested by Eleanor Szeto, I am submitting the attached document in response to the Telecommunications Industry's review of the <u>Unified Dialing Plan for Overlays</u>, so that the Industry can reconsider the merits of this plan in light of my response.

The industry's review offers me a great opportunity to clarify some misunderstandings, and to answer many questions about how the <u>Unified Dialing Plan for Overlays</u> (UDPFO) actually works, and the benefits it offers.

The attached document contains both the industry's comments about the UDPFO and my responses to those comments. Please present it to appropriate industry members for re-evaluation.

The UDPFO offers an elegant, technically workable solution to a difficult, persistent problem. It presents a way to add new numbers to an exhausted area without disrupting any established dialing patterns to pre-relief phone numbers. Because it is "backwardly compatible" with established dialing patterns, implementing this plan will minimize the expense and hardship that local business and the public have traditionally endured every time relief has been necessary. Examination of the attached review/response will clarify why the UDPFO should be seriously considered by the Telecommunications Industry as an option for area code relief.

Thank you for taking this second look.

I will be happy to supply additional copies of this document as well as copies of the original <u>Unified Dialing Plan for Overlays</u> proposal, and any other materials or information you may require to assist in your evaluation.

Sincerely,

Gilbert Yablon ATTACHMENT

In this response, each paragraph of the Telecommunications Industry Review of the Unified Dialing Plan for Overlays (from 8/12/97) is reproduced word-for-word in italics. Mr. Yablon's response (in plain type face) follows each industry statement.

What the industry said in their review:

At the Camarillo public meeting Mr. Gilbert Yablon presented his "Unified Dialing Plan for Overlays," a plan intended to resolve the dialing disparity associated with overlays. Mr. Yablon described his plan briefly and provided an extensive written description to the Telecommunication Industry.

Mr. Yablon's response:

I'd like to clarify the intent of the plan, which I believe is misstated above by the industry. The intention of the plan is to provide a technically workable alternative for area code relief which will minimize hardships to local business and the public. Hardships would be defined as expenses to the customer and disruption of established dialing patterns to any pre-relief phone numbers.

The Unified Dialing Plan For Overlays (UDPFO) offers a way to add new numbers to a geographic area without needing to change the way that existing numbers are dialed in any manner. Established 7 and 1+10 digit dialing patterns are maintained and a new 8 digit option is enabled which allows for abbreviated dialing within and between all area codes in the geographic overlay area.

Further, it demonstrates how dialing parity (mandated by the FCC) can be maintained in an overlay without requiring the full 10 digit (or actually 1 + 10 digit) phone number to be dialed.

What the industry said in their review:

A Telecommunications industry review of the eight (8) digit dialing plan as outlined by Mr. Yablon shows that the plan attempts to address a concern among members of a community who are anticipating an Area Code split.

Mr. Yablon's response:

I would clarify the above paragraph to say instead: The dialing plan as outlined by Mr. Yablon addresses the concerns among members of a community who are considering an Area Code Overlay for relief. It addresses the issues that the public described regarding overlays during the 818 area code hearings in 1995. It also addresses the issues that the CLECs put forth during those hearings. In fact, the UDPFO was specifically tailored to resolve those overlay related issues.

What the industry said in their review:

Mr. Yablon's plan consists of a dialing scheme which attempts to preserve seven digit dialing within an overlay. Mr. Yablon's plan is based on a system of number suffixes that depend upon pauses in the dialing process creating an eight (8) digit dialing plan. While Mr. Yablon's proposal appears to enable seven-digit dialing for callers in the original NPA; callers in the overlay NPA would dial eight (8) digits. Upon closer inspection the industry concluded that Mr. Yablon's plan was unworkable for many reasons that include technical, regulatory, competitive, customer provided equipment (CPE) and customer education issues. These issues and the Telecommunications Industry's concerns are listed below:

UDPFO.response 1 of 8 11/23/97

Mr. Yablon's response:

More accurately, the above might read: Mr. Yablon's plan consists of a dialing system which:

- 1) Allows for optional (not mandatory) 1+10 digit dialing between all area codes in the geographic overlay area.
- 2) Unifies all area codes in the geographic overlay area with a simple 8 digit (7+suffix) dialing system. The suffix represents one of ten possible overlaid area codes with '0' being the original area code, '1' being the first overlaid area code, '2' being a future second overlaid area code, etc. When the switch receives the full 8 digits, it translates the number into a traditional 10 digit number (3 digit area code + 7 digit phone number) and passes it through the network as if the number had been originally dialed as 1+10.
- 3) Preserves established '7 digit style' dialing (see explanation below of how this <u>default</u> <u>dialing</u> is accomplished by using a 'timing delay') to all phone numbers in the original area code from any area code within the geographic overlay area.

Functionally the network switch will be looking for either 1+10 style numbers or 7+suffix style numbers. With default dialing, if only 7 digits are dialed, after an appropriate timing delay the switch will assume that '0' is the intended 8th digit and will put the call through to the original area code of the overlay area. In this way backward compatibility is achieved for dialing to 'pre-relief phone numbers' from any area code in the geographic overlay area, and the system appears completely non-disruptive to the customer.

It should be noted that while numbers in all of the area codes within the geographic overlay area can be reached by dialing either '7+suffix' or '1+10', the '7 digit default' dialing option (which requires a timing delay) applies only to numbers in the original area code and only under default conditions. On the surface this would seem to violate dialing parity, however, on closer examination it is obvious that very few people would intentionally take advantage of this option. Because of the timing delay when only 7 digits are dialed, customers will quickly opt for dialing the 8th digit (in this case '0') in order to complete calls in the most expedient way. This 7 digit option is really only provided in order to ease the transition into an overlay scenario. It eliminates the need for a permissive dialing period, ensures that any phone number that had been dialed with 7 digits in the past could still be dialed the same way, and would eliminate the need for immediately updating auto dialers and data bases. More than likely, (a short time after implementation of the UDPFO), 7 digit calls will only be initiated by auto dialers which had been programmed pre-relief (i.e. alarm system auto dialers) which are typically difficult or costly for their owners to update.

With the above summation of the 'plan', and with the following responses to the Telecommunications Industry's concerns, I hope the regulators and the industry will find it advantageous to re-open discussions about the merits and feasibility of the UDPFO.

UDPFO.response 2 of 8 11/23/97

Technical Issues:

What the industry said in their review:

• The increase in real time processor delay inherent in this plan can have severe impacts on the existing public network and may have dire impacts in the future. Any increase in call delay will stress the network and render ineffective the gains in efficiency the CCS/SS7 Network provides.

Mr. Yablon's response:

No explanation was provided with the above comments, therefore, it is difficult to respond to the comments. However, any delays that might occur would happen prior to connection to the CCS/SS7 network and would have no impact on the efficiency of the CCS/SS7 network. The industry also needs to explain what the 'severe impacts on the existing public network' would be and provide some examples of 'dire impacts in the future'.

Also, as explained earlier, very few calls will actually be intentionally made using the '7 digit default' method -- which requires a delay. Most calls within the geographic overlay area will be initiated with the '7+suffix' method which avoids the delay. With traditional relief alternatives, a large number of calls that previously only required 7 digit dialing would afterwards require dialing 1+10 digits. A better question might be "how much stress is put on the network by the additional time required to dial 1+10 digits after a split or a standard overlay is implemented?" It may very well be that the 7+suffix method of the UDPFO would result in an overall network time savings compared to 1+10 digit dialing. The network would save the time it takes for dialing those 3 extra digits.

What the industry said in their review:

• On demand features such as Auto Call Return, Busy Number Redial and other enhanced services will be severely impacted by the need for additional digits.

Mr. Yablon's response:

In function, all numbers dialed in the Unified Dialing Plan are translated to 10 digit numbers by the network before switching begins. This is the same way that phone numbers have been know to the network since the 1940's. It seems hard to imagine that there would be any impact on services that have already been designed to use 10 digit numbers.

What the industry said in their review:

• The complexity of software development, time required to install switch upgrades, and the impacts upon memory capacity will severely impact switching technologies such as 5ESS, IAESS, OSPS, AGCS GTD5, DMS 100, DMS10, TOPS and Access Tandem switches.

Mr. Yablon's response:

Exactly what are these costs? How do they compare to the overall cost of a split or an overlay in terms of cost and disruption to both the phone companies and the public? A single area code split costs local businesses between 20 and 40 million dollars, and the phone companies spend between 6 and 10 million per split. Would the cost of developing the software and installing switch upgrades be greater than the overall cost of even 1 area code split? It is very possible that

developing this technology could quickly pay off as an overall savings. While it is obvious that there is a cost associated with any change to the network, it is also obvious that it is not the only cost. Until a fair assessment is done to evaluate the total cost, comments such as those made by the industry are without merit.

What the industry said in their review:

• The increase in complex digit analysis (non-sequential digit analysis) will place undue delays in the provisioning of the Federal Communication Commission (FCC) mandated Local Number Portability (LNP) features within the North American Numbering Plan (NANP).

Mr. Yablon's response:

The above comment is an opinion and not based on fact. As stated earlier nothing in what I am proposing changes the 10-digit format and therefore should have no impact on Local Number Portability. As currently proposed, Local Number Portability is simply intended to allow a customer to change his/her carrier without requiring a number change.

What the industry said in their review:

• On page 3 of the plan, the second bullet indicates that switch analysis will be run examining the eight digit first. This will require post digit analysis causing a further increase in the time required to process the call.

Mr. Yablon's response:

This comment requires a further explanation (by the industry) which should include the timing differences between the various dialing scenarios.

Regulatory Issues:

What the industry said in their review:

• The Federal Communication Commission and the California Public Utilities Commission require 10 digit dialing with an overlay of an area code. Further, the Industry Numbering Committee has endorsed 10 digit dialing as a standard, and the expected need to move beyond the 10 digit format arrangement in the future to possibly 12 digits renders Mr. Yablon's plan unusable and unworkable.

Mr. Yablon's response:

This plan introduces new ideas which challenge the necessity of using 1+10 digits in order to maintain dialing parity in an overlay situation. In the Unified Dialing Plan, dialing parity is provided with only 8 digits.

The 12 digit format that is planned for the future does not necessarily render this plan unusable and unworkable. In addition, it is my understanding that Local Number Portability and other actions to conserve the existing resource should delay expansion until well into the next century. However, even with expansion, if thought is given to maintaining the same backward compatibility that the Unified Dialing Plan offers for overlays, this plan can very likely co-exist with a plan requiring any new number of digits.

UDPFO.response 4 of 8 11/23/97

What the industry said in their review:

• Section 251 (b)(3) of the Telecommunications Act imposes a duty to provide dialing parity to competing providers of telephone exchange service and telephone toll service. The Unified Dialing Plan's provision that incumbent customers, retain seven digit dialing while others do not appears to violate that provision.

Mr. Yablon's response:

This is a misunderstanding of how the plan works. The Unified Dialing Plan for Overlays does not violate dialing parity. All of the area codes in the UDPFO are able to initiate calls with any of the 3 available dialing options ('7 digit default', '7+suffix', or '1+10'). There is no dialing advantage or disadvantage associated with either the original area code or any of the overlaid area codes. Customers from any area code within the geographic overlay area can dial the original incumbent area code with '7 digit default' (which always requires a timing delay) -- but why would they want to, when they can make the call more expediently by simply dialing it as an 8 digit number (7digits+'0') and thus avoid the delay?

The '7 digit default' option is provided so that there is no <u>penalty</u> to people who already have phones and services in the original area code; who would otherwise be forced to immediately change dialing habits, update auto dialers and reprogram 'alarm type' systems from '7 digit' to '8 digit' or '1+10 digit' dialing.

Competitive Issues:

What the industry said in their review:

• The Telecommunications Act imposes a duty to provide dialing parity to competing providers of telephone exchange service and telephone toll service. The Unified Dialing Plan's provision that incumbent customers retain seven digit dialing while others do not appears to violate that provision.

Mr. Yablon's response:

Same answer as above.

What the industry said in their review:

 Any dialing plan change would have to be agreed upon by the entire North American Telecommunications Industry.

Mr. Yablon's response:

The beauty of this plan is that it solves local dialing issues and does not affect 'dialing to' or 'dialing from' any 'outside' area codes. It could be adopted on a situation by situation basis, and would have no impact on dialing or switching for the rest of the telephone network. Universal agreement would be great, but it is unnecessary for implementation of this local solution.

Customer Provided Equipment (CPE) Issues:

What the industry said in their review:

• Customer provided equipment such as PBX's, telephone key systems, speed dialers, burglar alarms, modems, Telephone Answer Service (TAS), pay telephones and auto dialers may require adaptation by the manufacture to accommodate this change. The creation of Manufacturing system standards will require agreement to this change which will entail time and dollars. Standards must be developed within National Guidelines for the Manufacturers to meet.

Mr. Yablon's response:

The key words in the industry comments are "may require adaptation". Until the manufacturers have an opportunity to respond the remainder of the comments should not contain such statements as "will require agreement" and "must be developed". One of the main advantages of this plan is that it minimizes the impact on devices such as speed dialers, burglar alarms, and auto dialers because it eliminates the need to reprogram them when the numbers they have been set up to dial are split off into a new area code, or when 7 digit numbers need converting to 1+10 (as would be the case if a standard overlay were implemented). In most cases, PBX's, telephone key systems and pay phones would also be unaffected since the suffix logic is handled at the network switch level. At most, a PBX software change might be necessary to allow the output of the 8th digit. This would certainly be less disruptive to a PBX than a traditional area code split. Any problems that are caused may well be less significant than those caused by recent changes that have been made to the NANP, i.e. PBX problems caused by 2-9 being used for the second digit of an area code and 0-1 being used for the second digit of a prefix.

What the industry said in their review:

• Computer Telephony Integration (CTI) products such as computer software dialing programs, dial-in/dial-back security systems and credit card validation systems may require adaptation by the developer to accommodate this change.

Mr. Yablon's response:

There should be no effect on CTI products since all numbers will still be known to the network as 10 digit numbers, and will be still be reported by network Caller ID type systems to telephony equipment as those same 10 digit numbers. Any device on the receiving end of a call would recognize the caller in the same way that it always has.

Customer Issues:

What the industry said in their review:

• The radical changes in dialing contemplated by this plan would create a formidable public education challenge.

Mr. Yablon's response:

The '7 digit default' dialing option allows for an easy transition into the Unified Dialing Plan for Overlays. All existing numbers can still be dialed the same way that they always have been from any area code in the overlay area. All numbers can also be dialed with '1+10 digit' dialing, which is also nothing new to learn. The only new option is the '7 digit + X' suffix option, which is different, but not difficult to understand or learn. Public education is probably less of a challenge than in an area code split (where you can no longer reach certain numbers the way you have in the past) or in a standard overlay (where every number changes to 1+10, which is also different from what customers are accustomed to).

What the industry said in their review:

• Insertion of any delay in the completion of calls will cause customer confusion, increase trouble reports, and increase customer dissatisfaction.

Mr. Yablon's response:

Call completion delays will be minimal. As stated before, the 8 digit option would be the preferred (or dominant) dialing method in a UDPFO scenario. The '7 digit default' dialing option (which requires the timing delay) is really only offered to facilitate transition to an overlay, and it eliminates the need to immediately reprogram auto dialers and alarm systems which can be extremely time consuming and expensive to the customer (especially businesses). In a short time customers will (on their own) start using the more expedient 8 digit option.

What the industry said in their review:

• Added call process time plus any delays in call processing due to LNP deployment will cause a large composite time delay for call completion for customers.

Mr. Yablon's response:

The industry should be challenged on this because they should be providing actual numbers, instead of just making statements like "a large composite time delay" would result.

What the industry said in their review:

The industry would like to thank Mr. Yablon for the presentation of his plan. Mr. Yablon's work in attempting to eliminate dialing disparity in an overlay shows a valiant effort in creativity and analysis of a complex issue. The Telecommunications Industry is always willing to accept ideas for review and consideration.

Mr. Yablon's response:

Again, the industry has misstated the purpose of the UDPFO. The true purpose of this plan is to eliminate the expenses and hardships that customers have endured whenever area code relief has been necessary. By allowing backward compatibility for existing dialing patterns to pre-relief phone numbers, the UDPFO simplifies the public's transition to overlays and eliminates direct costs, hardships and confusion for the customer. The 8 digit dialing option that is part of the plan demonstrates how dialing parity can be maintained in an overlay without requiring the full 1 + 10 digit phone number to be dialed. This is a further convenience to the customer, and it provides a sense of 'unity' (instead of the sense of disunity) in an area where multiple area codes co-exist.

What the industry said in their review:

Unfortunately, as stated above, Mr. Yablon's plan is not a viable solution.

Mr. Yablon's response:

Taking my responses and clarifications into account, perhaps the conclusions of the industry might be re-evaluated. I believe that this plan addresses and resolves all of the public policy issues that are presented by splits and standard overlays. Given its benefits, if this plan is now given a fair evaluation by the industry in terms of "how can we make this work" instead of proclaiming "why this plan won't work", the industry will be providing its customers and our communities a great service.

Thank you very much for your time.

If you have questions or comments regarding this information, please contact me at:

818-999-1070 (voice/voice mail) 818-956-2200 (alt. voice) 818-956-3298 (fax)

UNIFIEDdpo@AOL.com (email)

Gilbert Yablon The Unified Dialing Plan for Overlays 21914 Dumetz Rd. Woodland Hills, CA 91364

ATTACHMENT 5

INC ISSUE #141 (THE INDUSTRY NUMBERING COMMITTEE'S REVIEW)

The following page makes up ATTACHMENT 5

INDUSTRY NUMBERING COMMITTEE (INC) ISSUE IDENTIFICATION FORM ISSUE TITLÉ:

Non-Disruptive Alternatives for Area Code Relief Using Overlavs

ISSUE ORIGINATOR: Gilbert Yablon

COMPANY: Unified Dialing Plan for Overlays TELEPHONE #: 818-999-1070

REQUESTED RESOLUTION DATE:

Long before NANPE.

ISSUE #: 141

DATE SUBMITTED: 7/13/98 DATE ACCEPTED: 7/13/98 **WORKSHOP ASSIGNED: NPA CURRENT STATUS: Resolved RESOLUTION DATE: 1/25/99**

- 1. **ISSUE STATEMENT:** Current NPA relief methods present hardship and expense for local business and the public. A serious and comprehensive evaluation of technically workable, non-disruptive alternatives is warranted. It is estimated that a single area code split costs customers between 20 and 40 million dollars. The transition to 10 digit dialing in overlays is also expensive since all local auto-dialers need to be updated, and efficient abbreviated dialing patterns are permanently abandoned. The disruption from both splits and overlays is taking a toll on the American people. Articles written almost daily accurately portray the magnitude of the problem. The Unified Dialing Plan for Overlays proposes an abbreviated local dialing system which allows 8 digit dialing between traditional 10 digit NPAs in an overlay. It also provides a non-disruptive mechanism for preserving established dialing patterns to existing 7 and 1+10 digit numbers. The plan can co-exist with some of the current proposals for NANPE, and still provide benefit to customers at that time.
- 2. SUGGESTED RESOLUTION OR OUTPUT/SERVICE DESIRED: It is important for the industry to evaluate this plan, both technically and conceptually, with an "outside of the box approach". Look at the benefits it offers customers over the current alternatives, and determine how this plan, or a variation of it, can be considered as one of the available options for area code relief.
- 3. OTHER IMPACTS (if any): North American Numbering Plan Expansion.
- **CURRENT ACTIVITY:** INC38 Issue accepted and assigned to NPA Workshop. INC39 - A presentation was given on the plan by Mr. Yablon. After discussion the Workshop agreed that it could progress the issue no further. A resolution to the issue will be developed at INC40 to place the issue in Initial Closure.

INC40 - Various contributions received from Mr. Yablon. Issue placed in Initial Closure.

INC41 - Issue placed in Final Closure.

RESOLUTION 5.

The INC identified and discussed the following technical and public policy concerns about Non-Disruptive Alternatives for Area Code Relief Using Overlays:

Competitive Dialing Issues

- Different Network and Operations Support Systems vs. Current 10 Digit Overlay Implementation Requirements
- Network Timing Issues (i.e., Post Dialing Delay and Announcement Duration)
- Telephone Directories and Listing Services
- **End User Concerns**
- **CPE Impacts**
- Concerns About Implementation Costs
- Ubiquitous Deployment Issues (e.g., National Carriers)

Consequently, the INC decided against further work on this issue as it currently exists.

6. **UPDATED:** 1/25/99

PERSONAL TECHNOLOGY

New Area Code's a Wrong Number for Some Security Systems

TELECOM TALK

By ELIZABETH DOUGLASS TIMES STAFF WRITER

Apartment building and condominium owners and residents from Redondo Beach to Malihu and from Gardena to Beverly Hills are learning a hard and costly lesson about area code overlays.

Throughout the 310 area code territory, building security and dialup telephone entry systems inexplicably stopped working, leaving visitors and delivery workers stranded
outside. Building owners and managers were deluged with frantic calls.

"We couldn't figure out what was wrong, the equipment just wasn't dialing," said Philip C. Gould, president of a Z7-unit condominium association in Westwood. "It hit a lot of people,"

The cusprit: the addition of a second area code in the 310 region using the "overlay" method.

The state-approved plan that went into effect April 17 calls for two area codes to serve the same geographic territory and requires callers in the region to dial 1 and the area code and the number.

The four extra digits, however, tripped up many building security and entry systems that are programmed to handle seven-digit phone numbers. Such dial-up systems typically allow visitors to key in a resident's code (often two or three digits), triggering the system to dial the resident's pre-programmed number.

"It wipes out both the security systems and the entry systems, so the impact is quite pronounced," said Harold Greenberg, president of the Apartment Assn. of Greater Los Angeles, which serves building owners and managers covering 300,000

units. "Everybody got caught flatfooted on this, and they're frantic."

There are an estimated 13,562 apartment and condominium buildings in the 310 overlay region, representing about 187,000 units, according to figures from Marcus & Millichap, a Palo Alto-based real estate brokerage.

Greenberg estimated that up to 70% of the buildings have systems old enough to need a major upgrade.

Newer dial-up entry systems can be fixed by upgrading the circuit board inside and reprogramming all the phone numbers, according to Bill Lamb, owner of Lamb Security Systems in South El Monte. New boards cost from \$475 to \$575 each, Lamb said, and the total cost depends on the amount of phone-number reprogramming.

Systems 3 years or older, however, may not be upgradeable, which means building owners would have to replace the equipment. Replace-

ment costs range from \$1,400 to \$3,000, Lamb said.

Complicating the situation, many suppliers have been flooded with orders, and it can take several days or weeks for buildings to fix the problem. And until the problems are fixed, the systems won't work.

Harris Properties, a Culver City firm that manages apartment and condominium buildings, started upgrading entry equipment in January and spent \$15,000 to \$20,000 to outfit 30 buildings before 11-digit dialing began, according to Lionel Harris, president of the firm.

Once the new dialing system took effect, Harris said, one of the precious new computer boards was stolen. Harris, who said the board was probably taken by a vendor who was short on supplies, had to re-secure all the equipment to prevent further thefts.

Could said his building in Westwood, populated primarily by older residents, went without its entry system for about a week—raising concerns about emergency access, among other things.

"We were quoted a price of \$2,100 for the new equipment," Gould said, "and we had to go for it because we couldn't go out to bid and put people's lives in danger" with the delay.

State and federal regulators have long touted area code overlays as a method that is cheaper for the public than a traditional geographic split.

In a geographic split, a new area code is assigned. That can result in changes to stationery, business cards and potentially lost business if customers don't know about the new phone number.

But the entry-system problem shows that the overlay method has its costs as well.

Residents and businesses in the 310 region, for example, also have

had to pay to have their alarm systems reprogrammed or upgraded. In addition, some elevator emergency phones are not programmed to handle 11-digit dialing, and it can cost about \$150 per elevator to fix the problem.

Meanwhile, dialing 11 digits on every call—even those within the same area code—is continuing to stir rancor within 310.

The region's second area code, 424, is scheduled to begin being issued on July 17. But some legistators and others are urging the state to delay the introduction of 424 so other number conservation efforts can be tried.

For now, however, building owners and others in 310 have no choice but to pay for upgrades or replace dial-up systems.

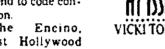
Elizabeth Congland can be reached at alizabeth dougland Oletinos.com.

ATTACHMENT 7

SMALL BUSINESS

Bill to Put Area Code Switches on Hold Has Support of Entrepreneurs

bill that would impose a statewide moratorium on area code changes is hitung a nerve with angry small-business owners who want an end to code confusion.



The West Hollywood and Beverly Hills



chambers of commerce have endorsed AB 818, introduced by Assemblyman Wally Knox (D-Los Angeles). The California Chamber of Commerce and the California Small Business Assn. are watching its progress. And small-business owners hurt by area code switches say it's about time somebody did something.

The bill, which goes before the Assembly Utilities and Commerce Committee next week, would impose a moratorium on area code changes beginning Jan. 1. It also would require the California Public Utilities Commission to work out alternative solutions to satisfying the demand for new phone numbers before creating more area codes.

Southern California businesses already struggle with 13 area codes. Five more will

> be in use by May 2000, and three others are proposed. They involve splits-cutting areas in two and adding a new area code—and overlays-imposing a new area code for all new users in old areas.

> "I'm all for a moratorium, because it's been a colossal hassle having Costa Mesa split up the way it is," said Jennifer Stockland, owner of Costa Mesa Florists, who last year had to change her area code from 714 to 949.

"We're constantly having to ask people what the area code is and then we get the wrong one," she added, "It divides the city. We've had to have everything reprinted. business cards, pamphiets, you name it.

Area code changes can be a nightmare for businesses because the telephone number is a lifeline to customers, said Charles Carbone a consumer advocate with the Utility Consumers' Action Network, a San Diego-based consumer rights organization with about 8,000 small-business owners among its 40,000 members.

"If it's not easy to get hold of you, and you're in a highly compeutive product or service, your customer is not going to wait," Carbone said. "They're going to go immediately to your competitor, whose number they have in front of them."

Business owners say that overlays, touted as the solution to area code splits, create their own problems, such as saddling a growing business with two area codes. Danny Ruiz, pharmacist at Statscript Pharmacy in West Hollywood, fears that adding a phone line with the 424 area code, when he aiready has 310, will confuse his elderly customers, who may stop turning to him for prescriptions and medical advice.

Laria Pippen, interim president of the West Hollywood Chamber of Commerce, says the city is only 1.9 square miles but will have three area codes-310, 323 and 424when the new 424 overlay takes

effect in July.

For companies that rely on local identity, the lack of a geographyspecific area code can damage business, as Stockland, the Costa Mesa florist, well knows. Out-ofstate customers seeking a local florist felt confident that they were getting a bona fide Costa Mesa florist when she had a 714 area code. Stockland said. But since the change to 949 last year, longdistance phone customers now question her location, thinking she's moved outside the city.

We hear personal, heartbreaking stories," said Mary Jo Borak, a regulatory analyst with the PUC, who regularly holds public hearings on area codes. (The PUC has not taken a position on Knox's bill.) Borak said one Oakland business owner, who repairs big-rig truck axles, told state officials his area code losses came to \$50,000, because he relied on business cards

banded out to truckers.

When Oakland switched from 415 to 650, he had no way to notify thousands of truckers across the nation about his outdated phone number. Although he spent \$30,000 in additional advertising, his business still declined by \$20,000 in one year, Borak said.

Knox insists that the technology. edata to provide area code relief. tbut that industry and PUC inertia. plus:a conflicting maze of federal and state regulations, block the solution and create number hoard ing and area code chaos 🕅

i-In California, for example, an estimated 180 million phone numbers are available under current area codes, but only 30 million are in use, according to PUC Commissioner Henry Duque. Yet the push for more area codes continues.

The reason is the inefficient way phone service computers and soft ware keep track of phone numbers assigned to service carriers. The equipment keeps track, not of individual numbers, but of the prefix, the first three digits of each sevendigit phone number.

ATTACHMENT 7 (continued)

Each prefix has 10,000 available numbers. A new phone company, for example, gets 10,000 numbers at a time for each relatively small geographic area, even if it wants only 3,000 numbers.

Demand from small-business owners and others with one or two voice lines, a fax line, Internet connections, pagers, celi-phones and even car phones is not the problem. The allocation system is the problem,

Fixing that problem will require not only Knox's bill in California, but also action at the federal level. The North American phone numbering system, if left as is, has a shelf life of only 20 years, accord-

ing to federal estimates.

The Federal Communications Commission is considering a proposal to conserve numbers using existing technology. The proposals include assigning numbers individually or in smaller blocks of 1,000, called "number pooling," to phone service carriers. Hearings may be held later this year, but any proposed solution would take three to four years to implement and invoive substantial expense and reprogramming of equipment by major carriers.

Relief Efforts Appear Stalled

The telecommunications industry has begun looking at expanding the number of digits used in phone numbers by one or two numbers. Telephone system equipment here and abroad would have to be changed, as well as consumer phone equipment, phone-reliant equipment such as alarms and databases with phone numbers, in addition to the expense of informing others.

At the state level, progress on area code relief appears stalled because California's phone carriers are not willing to undertake number pooling voluntarily. The PUC says it is blocked from ordering carriers to take such conservation measures because of a September FCC ruling in a Pennsylvania case, Borak said.

For its part, the FCC denies that

it has blocked mandatory pooling. saying it encourages states to submit plans and citing the example of Illinois, where mandatory number pooling recently received FCC approval.

The dispute is symbolic of the misunderstandings and conflicts in authority that exist between state and federal communications officials, with each pointing a finger at the other for stalled progress and delays. It helps explain why phone users keep shouldering the burden of more area codes when demand actually is coming from telecommunication companies and not users.

Knox's bill attempts to break through the logiam by requiring the PUC to seek FCC permission for number pooling, to set aside certain area codes for machines such as faxes and modems, and to reassign and recycle disconnected numbers faster.

"I don't think for a moment I've worked out the answer or resolution, but it's clear to me someone needs to play a role," Knox said.

For online information about area codes, go to http://www.cpuc .ca.gov or http://www.pacbell.com.

Times staff writer Vicki Torres can be reached at (213) 237-6563 or at vicki, torres @ letimes, com.

ATTACHMENT 8 Los Angeles Times

SATURDAY, FEBRUARY 21, 1998
COPYREGIT 1998/THE 1151ES MIRROR COMPANY (F. 141) (12) PAGES

Critics See No Need for New Area Codes

By JUBE SHIVER Jr. TIMES STAFF WRITER

WASHINGTON—The costly and disruptive nationwide explosion of area codes has long been blamed on popular gadgets such as fax machines and wireless phones, but critics are now charging that the shortage of telephone numbers is largely artificial.

Regulators in nearly half a dozen states are moving to impose moratoriums on new area codes out of concern that the burgeoning telephone industry is warehousing a vast reservoir of numbers instead of giving them to new customers.

Poor management of telephone numbers, coupled with a refusal by the

Please see PHONES, A20

PHONES:

ATTACHMENT 8 (continued)

Centinued from Al

telephone industry to invest in new technology, is driving a need for more new area codes than are necessary, they say.

The repeated changes of area codes, particularly in California, have inconvenienced tens of millions of U.S. consumers and saddled businesses with huge costs, triggering a growing consumer backlash that has caught federal regulators by surprise.

"Telephone number assignment policies are broken and antiquated and reflect the old Ma Bell monopoly when there was only one phone company serving a geographic area," said John Hanger, a Pennsylvania Public Utilities Commissioner. "The current system is lunacy It has to god."

lunacy. It has to end."

The telephone industry itenies that it has created an artificial shortage, arguing that it does not have the technology to avoid creating area codes. Critics say the technology does exist but that the phone companies find it cheaper to create area codes than invest in more sophisticated switching equipment.

Each area code change costs companies as much as \$40 million, according to one Pennsylvania estimate. Consumers are forced to reprogram their computers and home burgiar alarms, as well as notify friends and relatives.

ver the past three years, the number of U.S. area codes has surged 67%. The impact is especially large in California, which by the end of this year will have more than doubled the 10 area codes the state had in 1991. Exactly how much number hoarding is going on in California is unclear.

But of the 1.5 billion possible phone numbers created by the existing 193 area codes nationwide, about half a billion are not actively used, according to Lee Seiwyn, a Boston consultant who is assisting Itlinois regulators in examining the issue.

Selwyn said there are enough surplus telephone numbers to eliminate more than 60 area codes. The telephone industry acknowledges that there are surplus telephone numbers, but has not disclosed its estimates.

The recent rise in area codes, many experts agree, is more a case of the proliferation of new phone companies than the last-growing communications technologies traditionally blamed for the increase.

There are 55 million cellular phones in operation and 45 million pagers, besides the 174 million residential and business phone lines, according to industry estimates. (Each business line, however, can support up to 24 telephones.)

Every carrier licensed by the government to offer service in a state is entitled to order phone numbers. And in most instances, because there is no penalty for overestimating demand, they load up. As a result, phone competition can easily send the arithmetic of phone numbers off the charts.

The problem starts with the technology of switching equipment, which requires that allotments of telephone numbers be made in batches of 10,000. But in many cases phone or paging companies do not have customers for that many numbers.

The Pennsylvania Utihty Commission found that some local phone companies holding blocks of 10,000 numbers had given fewer than half a dozen to subscribers.

As competition in the telephone industry heats up, more phone companies are seeking batches of phone numbers.

In California, there are more than 60 carriers licensed to offer wireless or local phone service in the state. To compete statewide, each of those carriers needs an allotment of 10,000 numbers in each of 725 local dialong areas: a total of 7.25 million phone numbers for each company.

Regulators Ponder How to Deal With 310 Region

Yet another area code is on the way, this time targeting the 310 area, but code administrators could not decide whether to divide the region again or issue a second area code to work within the existing 310 boundaries.

The decision, which is up to state regulators, will affect Los Angeles County and a small part of Ventura County.

If the state chooses to split the region, a new area code would be assigned for El Segundo, Manhattan Beach, Hermosa Beach, Redondo Beach, Compton, Carson, Torrance, Gardena, Catalina Island, the Palos Verdes Peninsula, part of Inglewood and most of Hawthorne.

The new code would be introduced July 17. 1999.

Meanwhile, the "get acquainted" period for the new 626 area code expires early today.

-ELIZABETH DOUGLASS

Massive shifts in area codes are wreaking havor on many businesses.

John Bauer, a Fort Lauderdale food importer-exporter, said the region's recent addition of the 954 area code cost him several thousand dollars in direct expenses and untold lost business from overseas customers whose telephone equipment cannot handle new U.S. area codes without the traditional "0" or "1" in the middle.

To cope with the problem, Bauer said, he maintains a separate telephone number in the old 306 area code that serves Miami, and has calls forwarded to him in Fort Lauderdale.

"We've had to change everything," Bauer said.
"There must be a better way than constantly changing area codes. It's a real pain."

Around the nation, consumer opposition to area code proliferation is hardening.

The Ohio town of Parma last year presented former FCC Chairman Reed Hundt with petitions signed by 4,000 residents opposed to the addition of a 440 area code.

Hundt said later he was surprised by the depth of the public outcry, having never seen another case "where so many citizens have complained about the process." But state officials say that consumer anger over area codes should come as no surprise.

In Georgia, Public Service Commissioner Stan Wise said that if his state were to implement "an area code split, people would march on the Capitol."

The nation's area code system has been controlled by the Baby Bells and their research arm, Bellcore, But under a plan devised by an FCC advisory group, known as the North American Numbering Council, that authority is being transferred over the next year to contractor Lockheed Martin Corp. But whether Lockheed can stop the proliferation of area codes will depend on new technology.

In the current system, a caller dials seven to 11 numbers and initiates a series of electronic negotiations that makes a connection or results in a busy signal. When the number is received by the central office telephone switch, it checks to see whether the first digit is a "1," If so, it knows the call is long distance and sends the call to the designated long

distance company for processing.

The long distance company examines the area code and three-number prefix to route the call to the local switch that controls the dialed phone number Engineers say these central office switches are the Achilles' heel of the system.

They require that telephone numbers be allocated in blocks of 10,000 because the switches are not among enough to route calls unless all the numbers within a prefix belong to a single carrier. And carriers need blocks of 10,000 for each local dialing area or so-called rate center.

Critics say that more sophisticated switches are available that can handle calls to prefixes that are shared by more than one telephone company. Such technology would delay the need for new area codes for several years, Selwyn said.

Pennsylvania, Illinois and some other states are pressuring the phone industry to modify the phone network so that numbers could be allocated in units of 1,000 or less.

But some numbering officials say that the telephone industry is years away from updating the nation's phone network to allocate numbers in the smaller quantities sought by state regulators.

"We have to for the network and that's a big and complicated job," said Ron Conners, director of the Lockheed operation that manages the phone number system. "There are more than 10,000 switches out in the phone network. The problem is not that we are running out of phone numbers; it's that we are running out of these blocks of 10,000" units.

But faced with increasingly frequent requests to add area codes, trate state officials are vowing to crack down on area code proliferation.

Hanger and his four colleagues on the Pennsylvania Public Utility Commission last summer rejected a request to create area codes in a vast area of the state covered by the 215, 610 and 717 area codes and ordered the industry to conserve phone numbers instead. The states of Virginia, New Jersey and Illinois are weighing similar hans.

Selwyn, who is president of Economics and Technology Inc., said the area code explosion has been exacerbated by a 1995 Federal Communications Commission decision barring states from giving mobile phone users their own telephone area code.

He noted that New York City, the nation's largest telephone market and the last area allowed to segregate wireless carriers by area code, has added only one area code in the last 12 years—other than the 917 code set aside for wireless carriers in 1992. By contrast, Chicago and Los Angeles have each added five or more area codes in that period.

But the FCC argues that segregating cellular users by area code would be unfair because they would be the only consumers required to dial 11 digits for local calls.

The FCC does not oppose all overlays, which car help deal with demand for new telephone numbers. Unlike geographically splitting one area code in two, overlays superimpose a new area code on a region for new customers and existing customers retain their area codes. But the downside a local call.

Nonetheless, state regulators are overlays to wireless as a partial solution. The Connecticut Department of Public Utility Control voted last month to segregate all wireless services in their own area coducted and said it would ask the FCC to reconsider it prohibition.

Officials of the wireless industry, which is signing up 28,000 subscribers a day, say that they shouldn't be singled out for blame for area code proliferation.

At the current pace of number use, the available pool of three-digit area codes will be exhausted it about 30 years.

Area Codes VIIII

■ How is it we have to confuse ourselves so much with additional area codes and overlays within those areas, when many cities in Europe and Japan have merely added one single digit (and often the same digit) to existing numbers to handle the problem of demand for more telephone numbers? It is a lot easier to remember to just add the same number to everyone's old number than to try and figure out what new and unknown three-digit area code has been invented.

ROBERT SHARP South Pasadena

2-15-99

Area Codes

■ Re Jacob Tom's Voices piece, Jan. 30: I have long wondered why California is unable to implement eight-digit phone numbers. I sent correspondence to the PUC with this suggestion and received no reply. The phone companies of America seem to have assured a messy future by not changing their equipment to allow for a one-time change to eight-digit phone numbers.

Not only could Los Angeles regain the 213 area code throughout the entire city, but everyone would make the change at once, thereby eliminating future regional changes.

Learn from Hong Kong, England, Australia, Singapore and Japan, and go to eight-digit phone numbers; it's a solution that works.

MARK NEUMANN Lakewood

3-25-49

11-Digit Dialing

■ Re new telephone "overlay" codes that require people to dial 11 digits (March 19): The telephone companies have devised the most inefficient number system since Roman numerals—add one new phone number to a filled-up area and the result is an 11-digit number for everyone, even for local calls!

LEWIS H. COHEN Riverside

■ The only long-term solution to the area code problem is to make every home telephone number ninedigits instead of seven. Why not ser a date where every phone number in the country is lengthened by adding two zeros to the end of the number?

This way we keep a simpler area code map and avoid these terrible overlays. As more numbers are required, they can end in 01, 02, etc., right up to 99. It makes two fewer digits for everyone living with an area code overlay.

TIMOTHY BOND Hollywood

ATTACHMENT 9

4-29-99

Area Codes

The loss of business due to new area code changes must be enormous—this system of changing these codes is disruptive and fatal for some businesses. Customers cannot locate their party after they are told by a telephone voice, "Sorry, your call cannot be completed as dialed." It's a little late to change this system, but not too late to start a new way of adding telephone numbers.

For example, adding one digit to the present 10 numbers would augment the system with 99,999,999 new numbers for each present area code, thereby assuring enough numbers until the 22nd century.

> JOEL KAYE Sherman Oaks

Area Codes

E Splitting an area code into two area codes doubles the available phone numbers. However, simply adding another digit to existing phone numbers (making them eight numbers instead of seven) leads to a tenfold increase in phone numbers for an area code. And isn't it easier to remember one more number rather than three?

Existing numbers could all just have a zero added to them. What about this easy solution?

ALAN C. WEINBERG Fullerton

Phone Codes

 Instead of more area codes, couldn't customers have the flexibility of adding a mnemonic at the end of their seven digits: W for work, F for fax, P for pager and C for cellular, for example? This would allow one main phone number to replace as many as four separate numbers. As it is, area codes have strayed from their original design of having the second number always being lower than the first and third numbers (e.g., 213, 508, 617), which was designed to help differentiate the area code from the actual number.

Most people cannot retain sequences of more than seven digits. This mnemonic character approach would help reduce the proliferation of new codes that no longer adhere to the original area code format.

BRUCE M. GALE Los Angeles

BEFORE THE PUBLIC UTILITIES COMMISSION OF THE STATE OF CALIFORNIA

Order Instituting Rulemaking on the Commission's Own Motion Regarding Commission Policy on Area Code Relief.

R 98-12-014 (Filed December 17, 1998)

COMMENTS OF GILBERT J. YABLON REGARDING 8-DIGIT DIALING FOR OVERLAYS, FILED PURSUANT TO ADMINISTRATIVE LAW JUDGE TIMOTHY KENNEY'S RULING OF JUNE 29, 1999

VERIFICATION

I, Gilbert J. Yablon, am one of the parties in the above-entitled matter; the statements in the foregoing documents are true of my knowledge, except as to matters which are therein stated on information and belief, and as to those matters, I believe them to be true.

I declare under penalty of perjury that the foregoing is true and correct.

Executed on July 23, 1999 at Los Angeles, California

igned _____

Gilbert I. Yablon